

ATTEMPTS TO BLOCK LSD REACTION WITH BOL GIVEN
SIMULTANEOUSLY WITH LSD

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These experiments were carried out because the close chemical similarity of BOL and LSD suggested that BOL might block the LSD reaction by competing with LSD for receptor sites.

Subjects used were 15 nontolerant former morphine addicts, all Negro males who were in good physical condition who presented no evidence of major psychoses. Most of these patients had had considerable experience with LSD. They received, in randomized order, the following drug combinations: BOL placebo plus LSD placebo; BOL plus LSD; and BOL placebo plus LSD. The combination of BOL plus LSD placebo was not studied because of the shortage of BOL, and also because the results should be identical with those described in the report dealing with the acute effects of BOL.

The dosage of BOL was 2-4 mg./70 kg. of bodyweight and was given with the LSD. Nine patients received the higher dose. The dose of LSD was 0.5-1.5 mcgm./kg. Smaller doses were used in the first patients tested, because of the possibility that the drugs might synergize.

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Methods. Measurements included threshold for kneejerks, pupillary diameter, systolic blood pressure, the Abramson-Jarvik questionnaire, and grading of mental effects using the scale previously described. The results are shown in the table, a copy of which was sent with my letter of 8 March 1957. It is obvious that there was no significant blocking of the LSD reaction and no accentuation of it.

Conclusion. Administration of BOL simultaneously with LSD does not block or accentuate the LSD reaction. There is no reason to believe that giving BOL after LSD would give any different results, since Ginzler and Mayer-Gross have reported that intravenous administration of BOL does not reverse the LSD reaction. These results suggest that the attenuation of the LSD reaction observed after two days pre-treatment with LSD is due to the development of cross tolerance.

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Discussion. Because of the inconclusiveness of the experiment it will have to be repeated. Fortunately we have succeeded in obtaining an additional supply of BOL and will repeat the experiment using a larger number of subjects, all of whom will be tested with LSD prior to initiation of the formal experiment in order to eliminate nonreactors or to establish a dosage which will create a significant degree of reaction. We intend to give BOL for three days prior to LSD, two days prior to LSD, and to do another experiment in which a single dose will be given two hours before the LSD.